

Title (en)  
Semiconductor device and production thereof

Title (de)  
Halbleiteranordnung und Herstellungsmethode

Title (fr)  
Dispositif semiconducteur et méthode de fabrication

Publication  
**EP 1096555 A2 20010502 (EN)**

Application  
**EP 00123066 A 20001024**

Priority  
JP 30220799 A 19991025

Abstract (en)  
In forming a metal oxide dielectric film of perovskite type for capacitor, an array of lower electrodes and a crystallization-assisting conductive film are simultaneously formed. The crystallization-assisting conductive film is formed outside the lower electrode array, at a distance of about 10  $\mu\text{m}$  or less from the outermost lower electrodes, in a width of 20  $\mu\text{m}$  or more. Then, a metal oxide dielectric film is formed thereon. Since the crystallization-assisting conductive film assists the crystallization of metal oxide dielectric film, capacitor elements which are superior in properties and reliability even when the capacitor elements are produced in a fine structure is obtained. <IMAGE>

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**H01L 21/316**

IPC 8 full level  
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